

Corrdation between maternal body mass index at booking visit and the weight of the newborn in a term delivery

MD (Obstetrics and Gynaecology) Part 11 - 2004

D 1412

Objective of this analytical prospective study was to determine the co-relation between maternal BMI at booking visit and the weight of newborn and to analyze any possible co-relation of maternal age, parity, educational status, family income, ethnicity, religion and gender of newborn with birth weight. The study was conducted at De Soysa Hospital for Women, Colombo 8, for women who attend antenatal clinic of ward 16. Pregnant women registering at the clinic between 10th week and 15 weeks + 6 days of period of amenorrhoea who satisfied the exclusion criteria were followed up to their delivery between 37 weeks and 41 weeks + 6 days of period of amenorrhoea till the sample size was reached. The subject were followed up to their delivery. Additional information was collected from the bed head ticket and from a questionnaire. Data was interpreted by linear regression stepwise analysis. BMI had a significant co-relation with the weight of the newborn ($R=0.447$, $R^2=0.200$, $p<0.01$). After eliminating confounding variables in the model, results showed that a significant co-relation existed between weight of the newborn and maternal age ($R=0.148$, $p<0.01$). After eliminating confounding variables in the model, results showed that a significant co-relation existed between weight of the newborn and maternal age ($R=0.1438$, $p<0.01$), parity ($R=0.285$, $p<0.01$) and family income ($R=0.238$, $p<0.01$).